

WHAT IS CLAIMED IS:

1. An audio output control apparatus in a mobile terminal having an MP3 player for reproducing MP3-formatted audio data into an audio signal, comprising:

5 an ear jack for transferring the audio signal output from the MP3 player to one of a first and a second audio output device, connected thereto, and generating a sense signal indicating a type of the connected audio output device; and

10 a controller for determining the type of the audio output device connected to the ear jack depending on the sense signal and controlling an audio gain of the MP3 player according to the determined result.

15 2. The audio output control apparatus as claimed in claim 1, wherein the first audio output device is an earphone and the second audio output device is an external speaker.

20 3. The audio output control apparatus as claimed in claim 2, wherein the controller increases the audio gain when the external speaker is connected to the ear jack, and the controller decreases the audio gain when the earphone is connected to the ear jack.

25 4. The audio output control apparatus as claimed in claim 2, wherein the earphone includes a first ear jack connector connected to the ear jack for generating a sense signal of a first level, and the external speaker includes a second ear jack connector connected to the ear jack for generating a sense signal of a second level.

5. A method for controlling an audio gain of an MP3 player in a mobile terminal having the MP3 player for reproducing MP3-formatted audio data into an audio

signal, the mobile terminal including an ear jack for generating a sense signal indicating a type of an audio output device connected thereto, the audio output device including an earphone and an external speaker, comprising the steps of:

5 determining the type of the audio output device connected to the ear jack during an operation of the MP3 player; and

controlling the audio gain of the MP3 player according to the determined type of the audio output device connected to the ear jack.

6. The method as claimed in claim 5, wherein the controlling step
10 comprises the steps of:

increasing the audio gain when an external speaker is connected to the ear jack;
and

decreasing the audio gain when an earphone is connected to the ear jack.